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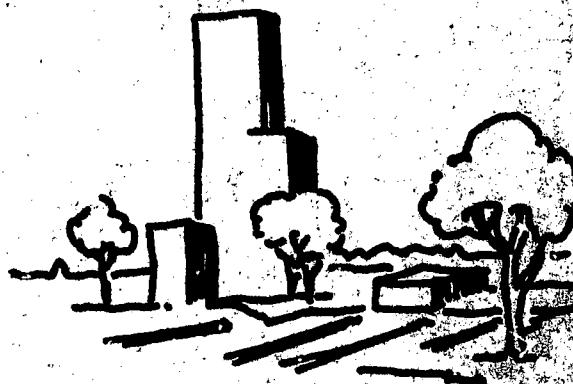
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One of a series of studies based on data collected from 1,844 eleventh and twelfth grade students in Canada examined educational and occupational aspiration levels of youth relative to selected school-related factors. Rural and suburban youth were compared. An attempt was made to assess the utility of the variables as predictors of aspiration levels of youth and the extent to which the variables might explain varying levels of aspiration. For each of the variables tested, socio-economic status was controlled. Statistical analysis of data, collected by means of questionnaires, indicated that urban youth aspired to higher levels than rural youth. There was no indicated relationship between aspiration levels and distance from school or number of schools attended; there were relationships between aspiration levels and I.Q., teacher encouragement, and participation in extra-curricular activities. Grade 9 examination scores appeared to be reasonably reliable indicators and potential predictors of later aspiration levels. Related documents are RC 003 186, RC 003 188, and RC 003 293. (SW)

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## School-Related Factors and The Aspiration Levels of Manitoba Senior High School Students



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**SCHOOL-RELATED FACTORS AND THE ASPIRATION LEVELS OF MANITOBA SENIOR HIGH SCHOOL STUDENTS**

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Associate Professor

The material reported in this paper represents but a portion of a larger research project undertaken by the A.R.D.A. Research Committee, Manitoba Department of Agriculture and Conservation, and the Faculty of Agriculture and Home Economics, University of Manitoba.

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The Faculty of Agriculture and Home Economics  
University of Manitoba  
Winnipeg, Manitoba

September, 1965

## **FOREWORD**

**This is but one in a series of reports dealing with different aspects of educational attainment, or lack thereof, of a group of Manitoba High School Youth.**

**Current interest in high school students, particularly their educational and occupational aspirations, stems from a broader interest in social change. Clearly the underlying assumption is that the higher the level of education the better prepared our youth will be to cope with the technological and social changes taking place.**

**The authors of these reports clearly accept the "goodness" of higher education. Nevertheless, these studies do provide us with empirical facts about the educational and occupational aspirations of the youth studied.**

**These facts are being provided for the benefit of our "social engineers" who have the difficult job of designing action programs that equip our people to cope with the rapidly changing conditions of our society.**

**G. Albert Kristjanson,  
Assistant Director,  
Economics and Publications Branch,  
Manitoba Department of Agriculture  
and Conservation.**

REPORTS IN THIS SERIES

**Leonard B. Siemens**

**The Influence of Selected Family Factors on the Educational and Occupational Aspiration Levels of High School Boys and Girls, Winnipeg, Faculty of Agriculture and Home Economics, University of Manitoba, Number One, June, 1965.**

**Leonard B. Siemens and J.E. Winston Jackson**

**Educational Plans and Their Fulfillment: A Study of Selected High School Students in Manitoba, Winnipeg, Faculty of Agriculture and Home Economics, University of Manitoba, Number Two, September, 1965.**

**Dennis P. Forcese and Leonard B. Siemens**

**School-Related Factors and the Aspiration Levels of Manitoba Senior High School Students, Winnipeg, Faculty of Agriculture and Home Economics, University of Manitoba, Number Three, September, 1965.**

**Leonard B. Siemens and Leo Driedger**

**Some Rural-Urban Differences Between Manitoba Youth (tentative title), Winnipeg, Faculty of Agriculture and Home Economics, University of Manitoba, Number Four. (In preparation: anticipated October, 1965.)**

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Dr. Emmit F. Sharp, Associate Professor of Sociology at Northern Illinois University, and Mr. G.A. Kristjanson of the Manitoba Department of Agriculture and Conservation.

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We are grateful also to Miss Colette Lafrance for her administrative assistance, and to Miss Mary M. Putnam for her excellent typing of the manuscript.

Not least, we should like to thank the National Grain Co. Ltd., of Winnipeg, without whose financial support neither the survey nor the publication of this report would have been possible.

There remains only to note that the responsibility for the final text of the report and any errors which might appear rests solely with the authors.

Dennis P. Forcese

Leonard B. Siemens

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## CHAPTER I

### INTRODUCTION

The automated industry of Twentieth Century Canada requires skilled personnel. An educational system that trains a high proportion of potentially able youth is a means whereby this modern industrial requisite will be satisfied. Yet youth must be motivated to take advantage of educational opportunities; an antecedent of attainment is aspiration.

During the Spring of 1964 a research project was undertaken in Manitoba to determine the factors associated with varying levels of aspiration among high school youth. Questionnaires were completed by 1844 senior high school students. These grade Eleven and Twelve students were from three areas of the province: 1) the rural Interlake region; 2) the rural Central Plains region; 3) two suburbs of metropolitan Winnipeg - Fort Garry and North Kildonan. (See Figure 1).

The questionnaires provided measures of the educational and occupational aspiration levels of the students.<sup>1</sup> The educational

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<sup>1</sup> For a thorough discussion of the research instrument and the survey method see: L.B. Siemens, The Influence of Selected Family Factors on the Educational and Occupational Aspiration Levels of High School Boys and Girls, Winnipeg, University of Manitoba, 1965, pp. 45-56. A copy of the questionnaire appears in this report.

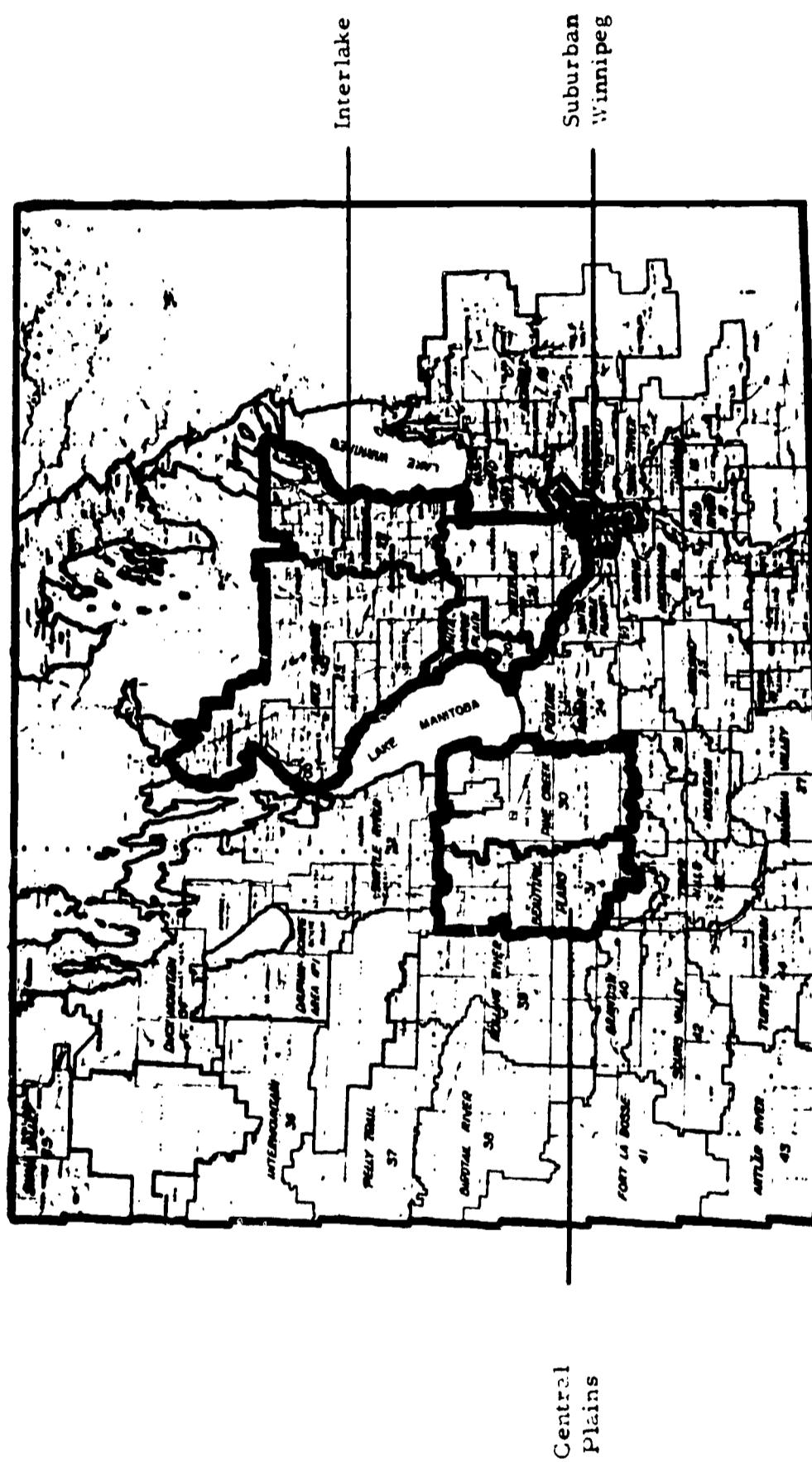


Figure 1

Southern Portion of Manitoba Outlining (Heavy Lines) the Three Survey Areas

aspiration level was determined simply by a respondent's statement of desired further education, while the occupational aspiration level was obtained by utilizing Haller's Occupational Aspiration Scale.<sup>1</sup>

An earlier report<sup>2</sup> of this Manitoba data discussed the relationship between the aspiration levels and the family backgrounds of the respondents. The author of the report, having pointed up the need to motivate youth to acquire the education and skills commensurate with the requirements of the modern work environment, endeavored to trace variations in aspiration levels to various aspects of family life. The underlying assumption was that the family was the key to the socialization of youth, the source of the values and attitudes that are reflected in the aspirations of young people.

The family-related variables that were examined included: size of community of orientation, socio-economic status, father's and mother's educational attainment, extent of parental encouragement of post-high school education for their children, normal as opposed to broken home situations, and ethnic and religious backgrounds.<sup>3</sup>

These variables were examined in relationship to both educational and occupational aspiration levels. With the exceptions of family ethnic

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<sup>1</sup> Archibald O. Haller, Irwin W. Miller, The Occupational Aspiration Scale: Theory, Structure, and Correlates, East Lansing, Michigan State University Agricultural Experiment Station Bulletin 288, 1963.

<sup>2</sup> Siemens, op. cit.

<sup>3</sup> Ibid., p. 1.

background and normal versus broken home situation, all the above variables proved at least partially relevant to variations in aspiration levels.<sup>1</sup>

The present paper is a brief sequel to the discussion of family-related factors. Although there are some differences in the approach to the data analysis,<sup>2</sup> essentially the purpose of this report is to follow-up the first, examining those data not properly included within the context of a discussion of the family as an agent of socialization.

Examined in this report are the educational and occupational aspiration levels of youth relative to selected school-related factors. These school-related factors may be thought of as comprising two classes: 1) "external" and 2) "internal" school-related factors.

The external variables are: area of residence, distance from

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<sup>1</sup> Ibid., pp. i-ii.

<sup>2</sup> The differences can be briefly noted: 1) The present analysis does not control for sex as was done for the first report. 2) The present analysis controls for socio-economic status (S.E.S.), distinguishing three socio-economic groups, whereas for the first report only two socio-economic groups were considered. 3) The present report does not provide the Coefficient of Contingency (C) values for the relationships discussed, although the C-values were reported in the first paper.

school, number of schools attended, and Intelligence Quotient scores.<sup>1</sup>

The internal variables are: high school examination scores, extent of teacher encouragement, extent of extra-curricular activities, and self-rated leadership ability.<sup>2</sup>

The internal variables are designated as such in that they are viewed as contributing to a student's self-image or self-conception.

It will be argued that a student's self-image of his competence will affect his level of aspiration.<sup>3</sup> Each of the internal variables, then, may be considered as parts of a larger composite - self-image.<sup>4</sup>

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<sup>1</sup> Information regarding these variables, with the exception of the Intelligence Quotient scores, was obtained from the questionnaires. The Intelligence Quotient scores were obtained from the records of the Manitoba Department of Education. The Intelligence Quotient Test used by the Department was the "Quick-Scoring Group Test of Learning Capacity, Advanced Grade Ten to Adult."

<sup>2</sup> Information regarding these variables, with the exception of the examination scores, was obtained from the questionnaires. The examination scores were of final examinations administered for Grades Nine, Ten, and Eleven by the Manitoba Department of Education. These scores were obtained from the records of the Department, and the scores for each Grade were averaged.

<sup>3</sup> See: Alvin Bertrand, "School Attendance and Attainment: Function and Dysfunction of School and Family Social Systems," Social Forces 40: (1962) 230-231. See also: A.O. Haller, I.W. Miller, op. cit., pp. 32-33.

<sup>4</sup> The external variable grouping - the school environment variables - is properly simply an "other" category consisting of those variables which do not appear to relate to self-image. Intelligence Quotient was included in the external grouping since in Manitoba the students are not told their I.Q. scores. Hence it could not contribute, in this case, to student self-image. Were the students aware of their I.Q. standings, then likely the I.Q. variable would relate to self-image.

There will be a threefold focus in dealing with the variables:

- (1) An attempt will be made to assess the utility of the variables as predictors of the aspiration levels of youth.
- (2) The extent to which these variables might explain varying levels of aspirations will be estimated.
- (3) The Manitoba data will be discussed with reference to related United States' generalization to allow an estimate of the degree to which the United States' findings are relevant to the Manitoba situation.

## CHAPTER II

### ANALYSIS OF DATA

The data were analyzed employing the Chi-square Test. The variables that are discussed in the pages that follow are those which were found, on the basis of this statistical test, to be significantly related to the aspiration levels of the students. Any test result above the .02 level of probability was not considered significant.

Variables for which data were available but which were not found significantly related to aspiration levels are not discussed in this paper.<sup>1</sup>

For each variable tested, socio-economic status (S.E.S.) was controlled.<sup>2</sup> That is, socio-economic status was held constant. The control was imposed since socio-economic status was found to be

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<sup>1</sup> The variables which were examined but which are not discussed are: number of rooms in school, transportation to school, car use, work at and away from home, and summer employment. Analysis prior to the S.E.S. control indicated that none of these variables significantly related to aspiration levels.

<sup>2</sup> Socio-economic status was determined on the basis of a battery of questions included in the questionnaire. These questions constituted a modification of W. Sewell's "Socio-Economic Status Scale." See: William H. Sewell, "A Short Form of the Family Socio-Economic Status Scale", Rural Sociology 8: (1943) 161-170. See also: L.B. Siemens, op. cit., pp. 49-52.

consistently related to aspiration levels in our data,<sup>1</sup> and that of other researchers.<sup>2</sup> The control was an attempt to eliminate the possibility that any significant relationship between a given variable and aspiration levels might purely be a reflection of socio-economic status.

#### The External Factors

##### 1. Aspirations by Region<sup>3</sup>

The data on which this report is based were not the products of a true random sample of Manitoba, but closer to what might be called a purposive sample. The three areas of the province which were selected for the survey contrasted with each other in terms of economic standing: The Interlake, an economically depressed region, the Central Plains, relatively prosperous, and the suburban areas, economically

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<sup>1</sup> Ibid., pp. 18-20. Although socio-economic status was found related to aspiration levels of Manitoba students, Siemens and Jackson found that there was no significant relationship between socio-economic status and the attainment of the educational aspirations of the Manitoba respondents. This, of course, is entirely reasonable in light of the "sorting-out process" that occurs at the stage of aspirations. For an explanation, see: L.B. Siemens, J.E.W. Jackson, Educational Plans and Their Fulfillment: A Study of Selected High School Students in Manitoba, Winnipeg, University of Manitoba, 1965.

<sup>2</sup> Frank E. Jones, The Social Bases of Education, Toronto, Canadian Conference on Children, 1965, pp. 11-35.

<sup>3</sup> See Appendix, Tables 1A and 1B. Distribution tables of all significant relationships between the variables discussed and aspiration levels appear in the Appendix.

well-off. By such a pre-selection of the survey areas a broad economic range was assured, on the underlying assumption that economic status was a crucial factor associated with aspiration levels.<sup>1</sup> Consequently, a variation would be expected between the three areas in the aspiration levels of their residents.

An examination of the data without the S.E.S. control indicated very little difference in the aspiration levels of the residents of the two rural areas. But a marked rural-urban split was apparent, with greater aspirations towards further education characteristic of the urban students. Less marked, but still clearly discernible, was the rural-urban distinction in occupational aspiration levels, with higher level occupations aspired to by urban students.

This tendency toward higher aspirations among urban than among rural youth is in conformance with American findings.<sup>2</sup> Although the variation in rural-urban aspiration levels is declining, it still is the case in the United States that urban students aspire higher than rural students.

When the area data were re-examined with the S.E.S. control, significant variation in educational aspiration levels was found between rural and urban students within the High and the Low S.E.S. groups.

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<sup>1</sup> The assumption was made on the basis of solidly established United States' findings. See: Ibid.

<sup>2</sup> Siemens, op. cit., pp. 18-20.

That is, of these students whose families fall into either the High or the Low S.E.S. categories, the urban students tended to have higher educational aspirations than the rural students.

When occupational aspiration levels were examined, holding S.E.S. constant, there was no significant variation in aspiration levels.

Hence, much of the variation in aspiration levels by region that had initially been detected in the data disappeared when an S.E.S. control was imposed. However, that some variation persisted even with S.E.S. held constant indicates that at least in some part the variation in aspiration levels reflects broader economic and cultural differences between the rural and urban school environments than measured by the S.E.S. scale. Such, for example, might be the greater breadth of social experience to which the urban resident is exposed - a difficult factor to quantify and measure satisfactorily.

## 2. Distance from School<sup>1</sup>

An aspect of the rural-urban distinction is the distance the student travels to school, with the rural student presumably having a greater distance to travel than his urban counterpart.

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<sup>1</sup>See Appendix, Table 2.

Researchers in the United States have hypothesized that the greater the distance the student travels to school, the less involvement in school affairs.<sup>1</sup> Subsequently, with less interest in the school social system, educational aspirations would be lower.

Initial indications from the Manitoba data were that distance from school was significantly related to levels of educational and occupational aspiration.

However, when the S.E.S. control was applied, distance from school was not found significantly related to educational aspiration levels in each of Low, Medium, and High S.E.S. groups.

Occupational aspiration levels varied significantly in relationship to distance from school only within the High S.E.S. group, where students living lesser distances from school tended towards higher levels of occupational aspiration.

### 3. Number of Schools Attended<sup>2</sup>

Initial analysis of the data had indicated that the number of schools attended by the student during Grades One to Eight, and during high school (Grades Nine to Twelve), was significantly related to levels of

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<sup>1</sup> Bertrand, op. cit., pp. 230-231.

<sup>2</sup> See Appendix, Tables 3A, 3B, and 3C.

aspiration. Contrary to common expectations which hold that mobility is detrimental to attainment - "the rolling stone gathers no moss" - the greater the number of schools attended the higher the levels of educational and occupational aspiration.

But with the S.E.S. control this relationship largely disappeared. The only relationships that persisted were within the High S.E.S. group.

Higher educational aspiration levels were found to be associated with a greater number of schools attended in elementary school and in high school.

Occupational aspiration levels were higher within the High S.E.S. group for those students attending a larger number of elementary schools. There seemed to be no relationship between occupational aspiration levels and number of schools attended during Grades Nine to Twelve.

#### 4. Intelligence Quotient<sup>1</sup>

Intelligence Quotient level (I.Q.) proved a good indicator of levels of aspiration. There was a very marked progression towards higher aspirations, both educational and occupational, as the I.Q. level rose.<sup>2</sup>

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<sup>1</sup> See Appendix, Tables 4A, 4B, 4C, 4D, and 4E.

<sup>2</sup> For related discussion, see: A. Haller, I. Miller, op. cit., pp 45-47.

Hence, if one considers I.Q. a measure of intelligence, then the greater the intelligence, the higher the aspirations. Or, if one doubts that I.Q. is an adequate measure of intelligence and prefers to consider the I.Q. score a measure of social experience, then the greater the social experience, the higher the aspirations.<sup>1</sup>

This relationship between I.Q. and aspiration levels persisted for the Manitoba data even when S.E.S. was controlled.

However, the relationship was not significant within the Low S.E.S. group when occupational aspiration level was considered. Only the occupational aspiration levels of the Medium and High S.E.S. groups were found significantly related to I.Q., with the higher I.Q.s related to higher aspiration levels.

#### The Internal Factors

##### 5. High School Examination Scores<sup>2</sup>

Examination scores, like I.Q., were examined for their utility as indicators of aspiration levels. Whatever they measure, whether ability or conformity, the examination scores of the students corresponded with their levels of aspiration.

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<sup>1</sup> The final report in this series of papers on Manitoba youth considers I.Q. as indicative of social experience. See L.B. Siemens, Leo Driedger, Some Rural-Urban Differences Between Manitoba Youth, Winnipeg, University of Manitoba (In preparation).

<sup>2</sup> See Appendix, Tables 5A to 5Q.

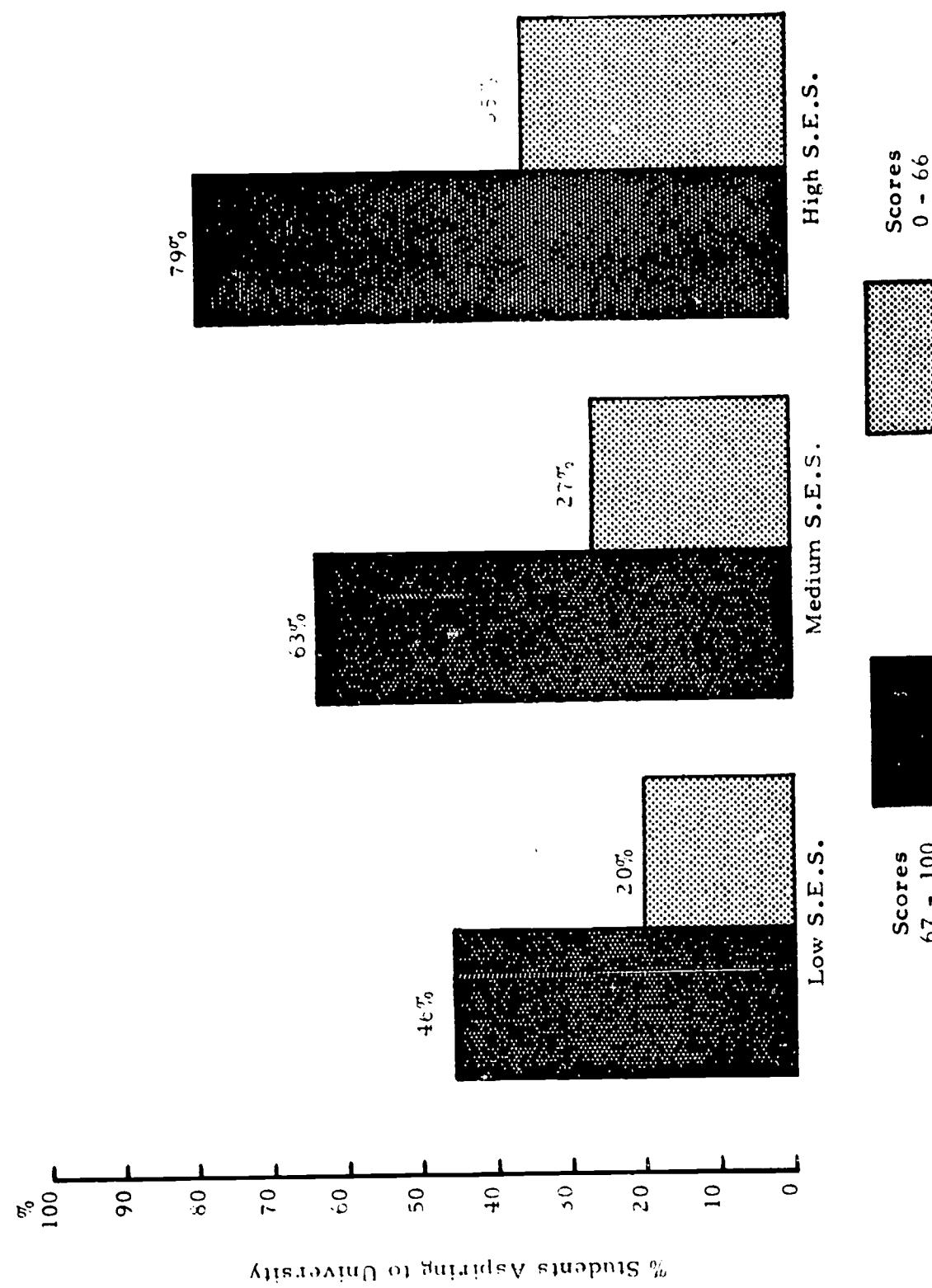
Examination of the data suggested that either Grade Nine or Grade Ten scores indicated a student's later aspiration levels. The educational and occupational aspiration levels of students presently enrolled in Grades Eleven and Twelve were found significantly related to the examination scores which they had achieved while in Grades Nine and Ten.<sup>1</sup> The higher the grades, the higher the aspiration levels.<sup>2</sup> This relationship persisted with the S.E.S. control. For each of the S.E.S. groups, the examination scores from Grades Nine and Ten were significantly related to educational and occupational aspiration levels.<sup>3</sup>

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<sup>1</sup> Grade Eleven scores were less reliable indicators of aspiration levels, as no significant relationship between Grade Eleven marks and occupational aspiration levels was apparent within the Low S.E.S. group. Probably this decline in consistency from Grades Nine and Ten relationships is due simply to the smaller number of respondents for whom Grade Eleven examination scores were available. The Chi-square Test of significance is affected by the total number of cases in the distribution table, since it is a test of probability of significant relationship. The greater the number of cases, the larger the Chi result; that is, the greater the probability that the variation present cannot be attributed to chance.

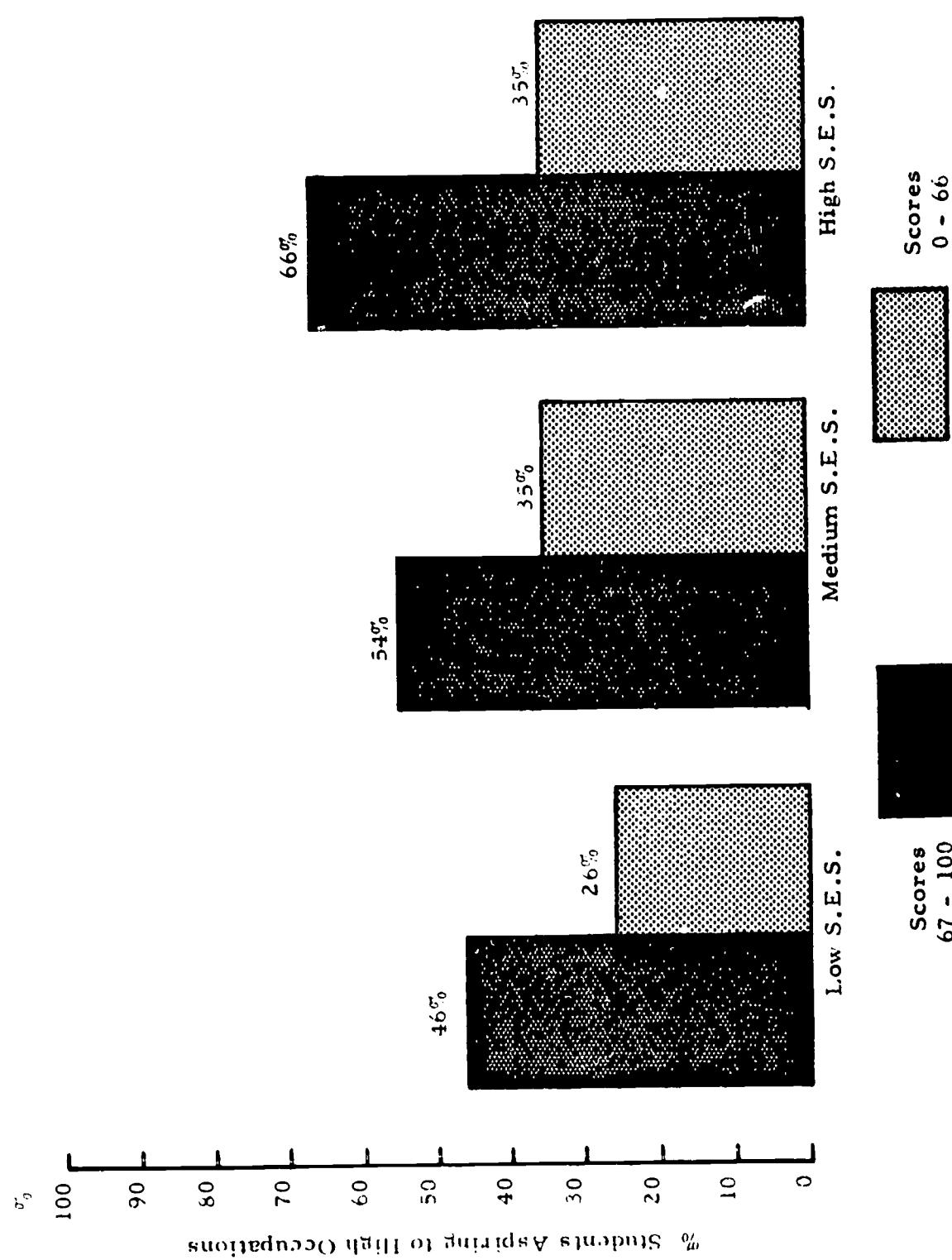
<sup>2</sup> For related discussion, see: Haller and Miller, op. cit., p. 39.

<sup>3</sup> Since there was a close relationship between examination scores and I.Q. levels, as well as between I.Q. levels and aspiration levels, we also controlled for I.Q. level and re-examined the relationship between examination scores and aspiration levels. Because of the small number of cases in both the very low and the very high I.Q. categories, we examined the two modal I.Q. groups - the 90 to 110 and the 111 to 120. Within these two I.Q. categories the significant relationship between examination scores and aspiration levels persisted. In all cases  $P < .001$ .



The Percentage of Students Aspiring to University by Average Grade Nine Examination Scores and by S.E.S.

Figure 2



**Figure 3**  
The Percentage of Students Aspiring to High Occupational Levels  
by Average Grade Nine Examination Scores and by S.E.S.

Hence Grades Nine and Ten examination scores appear to be fine indicators of the aspiration levels which high school students will later hold. But examination scores could well be considered as more than mere indicators. Conceivably examination scores play a major part in developing a student's self-image. As Alvin Bertrand has pointed up, a student may become trapped in a low-grade pattern.<sup>1</sup> Having initially scored poorly in examinations a student's self-image may develop as one of academic incompetence. The poor score may become the expected, and the expected consequently become self-fulfilling as the image of poor performance is reinforced by the reactions of peers and particularly by the reactions of teachers. Once caught in such a low-grade pattern the student would subsequently develop modest aspirations.

The data which were examined indicated that such a low-grade pattern with its accompanying detrimental student self-image could be in effect in Manitoba schools. There was an independent relationship between examination scores and aspiration levels when S.E.S. was controlled (and when I.Q. was controlled), indicating that grades were

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<sup>1</sup> Bertrand, op. cit., pp. 230-231. See also: Haller and Miller, op. cit., pp. 32-33.

more than just indicators, but possibly causal variables in their own right.

#### 6. Teacher Encouragement<sup>1</sup>

Contributing to a student's self-image - perhaps reinforcing a low- or high-grade pattern - would be the extent of teacher encouragement.<sup>2</sup> The data indicated a slight tendency toward higher aspirations among those respondents who reported having received at least some teacher encouragement.

When S.E.S. was controlled, an interesting pattern appeared. For both educational and occupational aspiration levels there was a significant relationship with extent of teacher encouragement within the Low and Medium S.E.S. groups. That is, for the Low and Medium S.E.S. groups, positive teacher encouragement was associated with higher aspirations. But for the High S.E.S. group, teacher encouragement appeared irrelevant, as no significant relationship was visible.

Probably, then, the High S.E.S. group receives sufficient encouragement from other sources, notably parents, whereas teacher encouragement

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<sup>1</sup> See Appendix, Tables 6A, 6B, 6C, and 6D.

<sup>2</sup> For related discussion, see: Jones, op. cit., pp. 78-83.

is more vital to students from the lower S.E.S. groups. The socialization received by the upper class students usually sees to their motivation, while the motivation of lower class students toward the middle class goals of higher education and occupational levels is considerably more precarious.<sup>1</sup> Their self-images would be more in need of bolstering.

#### 7. Self-Rated Leadership Ability<sup>2</sup>

An indicator of student self-image would be the student's evaluation of his leadership ability. The data indicated clearly that those students with enough self-confidence to rate themselves above-average in leadership ability tended to aspire to university educations and highly rated occupations.<sup>3</sup> Conversely, those students rating their leadership ability as below-average aspired to a non-university type of post-high school education, or no further education at all. Also, the low leadership estimators indicated low occupational aspiration levels.

This relationship was maintained with the S.E.S. control. For

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<sup>1</sup> Siemens, op. cit., pp. 34-44.

<sup>2</sup> See Appendix, Tables 7A, 7B, 7C, 7D, 7E, and 7F.

<sup>3</sup> For related discussion, see: Haller and Miller, op. cit., pp. 49-50.

each of the S.E.S. groups, those students rating themselves as above-average in leadership ability aspired to higher educational and occupational aspiration levels than those rating themselves below-average.

#### 8. Extra-Curricular Activities<sup>1</sup>

When considering all extra-curricular activities, from drama clubs to athletics, it was found that the greater the extent of extra-curricular activity the higher the educational and occupational aspiration levels.

Again this relationship suggests self-image, with the more confident youth tending to participate in organized activities more than those youth with less satisfying self-images.

When the S.E.S. control was applied the relationship between extent of extra-curricular activity and aspiration levels remained significant within the Medium and the High S.E.S. groups, but not within the Low S.E.S. group. With the exception of the Low S.E.S. students, then, there is a tendency toward higher educational and occupational aspirations among those students participating in more extra-curricular activities.<sup>2</sup>

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<sup>1</sup> See Appendix, Tables 8A, 8B, 8C, and 8D.

<sup>2</sup> For related discussion see: Haller and Miller, op. cit., p. 39.

Other Variables

With the research that had been done outside of Manitoba acting as a guideline, data were originally collected for variables other than those which have been discussed in the preceding pages. But when the data analysis was completed, only the variables discussed above proved significantly related to aspiration levels.

The omitted variables were: number of rooms in school, transportation to school, car use, work at home during the school year, work away from home during the school year, and paid summer employment. None of these factors appeared to affect the aspiration levels of Manitoba youth.

## CHAPTER III

### SUMMARY AND CONCLUSIONS

The tables immediately following in the Appendix re-present the research findings. These findings can be summarized as follows:

1. An examination of the educational and occupational aspiration levels of youth, distinguished by region, provided some indication of a rural-urban variation, with urban youth aspiring to higher levels. That the variation was not consistently evident through the three S.E.S. groups suggests, in conformance with United States' experience, that this regional variation is only partially a reflection of economic differences. Insofar as the economic factor is relevant, in turn it is suggested that as the rural-urban economic disparity decreases, so too will the rural-urban disparity in aspiration levels. But the rural-urban variation is also attributable to differences in the broader cultural milieux - differences that will likely become narrower with the continued diffusion of the influence of the urban-dominated mass media.
2. No consistent relationship was apparent between aspiration levels and two area-related factors - distance from school and number of schools attended. The data do suggest, however, that if the number

of schools attended is at all a relevant variable in relationship to aspirations, it would be for the High S.E.S. group. Within this group, the more schools attended, the higher the educational and occupational aspirations. Generally, only the High S.E.S. students have experienced a sufficient degree of mobility for there to be a measurable effect.

3. A relationship between I.Q. and aspiration levels did stand out.

The single exception that excluded a consistent relationship was the Low S.E.S. Group within which no relationship was visible. But generally, the greater the I.Q., the higher the aspirations.

4. High school examination grades were the most consistently related

to aspiration levels. Grade Nine examination scores appear to be reasonably reliable indicators of later aspiration levels. Hence, the higher the early grades, the higher the later educational and occupational aspirations - a relationship not established, but implied in United States research.<sup>1</sup>

In part this relationship between examination grades and aspiration levels is attributable to student self-image. In aspiring to low levels the student with poor grades is simply conforming to the expectations of friends, family and teachers.

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<sup>1</sup> Bertrand, op. cit., pp. 230-231.

5. Relating to self-image would also be teacher encouragement.

Teacher neglect of the poorly performing student is likely to reinforce poor performance, especially if the student receives little encouragement outside of the school. The data suggested that the Low S.E.S. Group students were most affected by the lack of teacher encouragement.

Within the Low S.E.S. Group, the more teacher encouragement, the higher the aspirations.

6. For the Middle and Upper S.E.S. Groups, degree of extra-curricular participation - another reflection of self-image - appear indicative of aspiration levels. For these Groups, the more extra-curricular participation, the higher the aspirations.

In summary, then, the most reliable indicator and potential predictor of youth aspiration levels, insofar as can be judged from these data, would be Grade Nine examination scores. And, more than predictors, grades may well prove intermediary variables affecting aspiration levels, whether grades conform to student ability or not.

Examination grades are the most important measures the student has available of his academic competence. When, whether from lack of ability, lack of motivation, or whatever, the student achieves poor grades he may become stigmatized as a poorly performing student,

in his own mind and in the minds of others. So stigmatized, continued poor examination grades and low aspirations are merely in conformance with the student's self-image.

**BIBLIOGRAPHY\***

Bertrand, Alvin L.

"School Attendance and Attainment: Function and Dysfunction of School and Family Social Systems," Social Forces 40: (1962) pp. 228-233.

Haller, Archie O., Miller, I.W.

The Occupational Aspiration Scale: Theory, Structure, and Correlates, East Lansing, Michigan State University Agricultural Experiment Station Bulletin 288, 1963.

Jones, Frank E.

The Social Bases of Education, Toronto, Canadian Conference on Children, 1965.

Sewell, William H.

"A Short Form of the Family Socio-Economic Status Scale", Rural Sociology 8: (1943) pp. 161-170.

Siemens, Leonard B.

The Influence of Selected Family Factors on the Educational and Occupational Aspiration Levels of High School Boys and Girls, Winnipeg, University of Manitoba, 1965.

The bibliography is comprised of only those works specifically referred to in this paper. For an extensive bibliography see: L.B. Siemens, The Influence of Selected Family Factors on the Educational and Occupational Aspiration Levels of High School Boys and Girls, Winnipeg, University of Manitoba, 1965.

**APPENDIX**

TABLE 1A\*

EDUCATIONAL ASPIRATION LEVEL RELATED TO REGION  
FOR THE LOW S.E.S. GROUP

Educational Aspiration Level	Region			TOTAL		
	Interlake	Central Plains	Suburban			
	No.	%	No.	%	No.	%
High	107	(32.1)	52	(33.3)	20	(64.5)
Medium High	88	(26.4)	41	(26.3)	4	(12.9)
Medium	90	(27.0)	47	(30.1)	6	(19.4)
Low	48	(14.4)	16	(10.2)	1	(3.2)
<b>TOTAL</b>	<b>333</b>	<b>(99.9)</b>	<b>156</b>	<b>(99.9)</b>	<b>31</b>	<b>(100.0)</b>

$$D/F = 6, \chi^2 = 15.69, P < .02$$

EDUCATIONAL ASPIRATION LEVEL RELATED TO REGION  
FOR THE HIGH S.E.S. GROUP

Educational Aspiration Level	Region			TOTAL		
	Interlake	Central Plains	Suburban			
	No.	%	No.	%	No.	%
High	64	(52.9)	53	(49.1)	200	(72.2)
Medium High	25	(20.7)	24	(22.2)	28	(10.1)
Medium	23	(19.0)	26	(24.1)	32	(11.6)
Low	9	(7.4)	5	(4.6)	17	(6.1)
<b>TOTAL</b>	<b>121</b>	<b>(100.0)</b>	<b>108</b>	<b>(100.0)</b>	<b>277</b>	<b>(100.0)</b>

$$D/F = 6, \chi^2 = 28.88, P < .001$$

\* In this and subsequent tables dealing with educational aspirations "High" or "1" refers to University, "Medium High" or "2" refers to Teachers' or Nurses Training, "Medium" or "3" refers to Technical School or Business College, and "Low" or "4" refers to no post-high school training.

TABLE 2  
OCCUPATIONAL ASPIRATION LEVEL RELATED TO DISTANCE  
FROM SCHOOL FOR THE HIGH S.E.S. GROUP

Occupational Aspiration Score	Distance from School								TOTAL	
	- 1		1 - 3		4 - 10		11+			
	Miles	No.	Miles	No.	Miles	No.	Miles	No.		
56-72	.39	(14.6)	27	(21.4)	10	(11.2)	4	(16.7)	80 (15.8)	
46-55	102	(38.2)	58	(46.0)	33	(37.1)	3	(12.5)	196 (38.7)	
36-45	89	(33.3)	33	(26.2)	26	(29.2)	10	(41.7)	158 (31.2)	
0-35	37	(13.9)	8	(6.3)	20	(22.5)	7	(29.2)	72 (14.2)	
<b>TOTAL</b>	<b>267</b>	<b>(100.0)</b>	<b>126</b>	<b>(99.9)</b>	<b>89</b>	<b>(100.0)</b>	<b>24</b>	<b>(100.1)</b>	<b>506 (99.9)</b>	

D/F = 9,     $\chi^2 = 25.92$ ,    P < .01

TABLE 3A

**EDUCATIONAL ASPIRATION LEVEL RELATED TO NUMBER OF  
SCHOOLS ATTENDED IN GRADES 1-8 FOR THE  
HIGH S.E.S. GROUP**

Educational Aspiration Level <sup>1</sup>	Number of Schools Attended						TOTAL
	2		3		4 +		
No.	%	No.	%	No.	%	No.	%
1.	82 (53.2)	69 (56.1)	89 (72.4)	77 (72.6)	317 (62.6)		
2.	30 (19.5)	19 (15.4)	14 (11.4)	13 (12.3)	76 (15.0)		
3.	32 (20.8)	26 (21.1)	15 (12.2)	9 (8.5)	82 (16.2)		
4.	10 (6.5)	9 (7.3)	5 (4.1)	7 (6.6)	31 (6.1)		
TOTAL	154 (100.0)	123 (99.9)	123 (100.1)	106 (100.0)	506 (99.9)		

$$D/F = 9, X^2 = 20.39, P < .02$$

TABLE 3B

**EDUCATIONAL ASPIRATION LEVEL RELATED TO NUMBER OF  
SCHOOLS ATTENDED IN GRADES 9-12 FOR THE  
HIGH S.E.S. GROUP**

Educational Aspiration Level <sup>1</sup>	Number of Schools Attended						TOTAL
	2		3 +				
No.	%	No.	%	No.	%	No.	%
1.	120 (54.8)	164 (67.2)	34 (77.3)				318 (62.7)
2.	38 (17.4)	36 (14.8)	3 (6.8)				77 (15.2)
3.	47 (21.5)	31 (12.7)	3 (6.8)				81 (16.0)
4.	14 (6.4)	13 (5.3)	4 (9.1)				31 (6.1)
TOTAL	219 (100.1)	244 (100.0)	44 (100.0)				507 (100.0)

$$D/F = 6, X^2 = 16.17, P < .02$$

**TABLE 3C**  
**OCCUPATIONAL ASPIRATION LEVEL RELATED TO NUMBER  
 OF SCHOOLS ATTENDED IN GRADES 1-8 FOR  
 THE HIGH S.E.S. GROUP**

Occupational Aspiration Score	Number of Schools Attended						TOTAL		
	1	2	3	4 +	No.	%			
	No.	%	No.	%	No.	%	No.	%	
56-72	19	(12.5)	21	(16.9)	19	(15.3)	21	(19.6)	80 (15.8)
46-55	50	(32.9)	38	(30.6)	61	(49.2)	46	(43.0)	195 (38.5)
36-45	51	(33.6)	45	(36.3)	36	(29.0)	28	(26.2)	160 (31.6)
0-35	32	(21.1)	20	(16.1)	8	( 6.5)	12	(11.2)	72 (14.2)
<b>TOTAL</b>	<b>152</b>	<b>(100.1)</b>	<b>124</b>	<b>(99.9)</b>	<b>124</b>	<b>(100.0)</b>	<b>107</b>	<b>(100.0)</b>	<b>507 (100.1)</b>

$$D/F = 9, \chi^2 = 23.21, P < .01$$

TABLE 4A  
EDUCATIONAL ASPIRATION LEVEL RELATED TO I.Q. LEVEL  
FOR THE LOW S.E.S. GROUP

Educational Aspiration Level	I.Q. Level								TOTAL	
	- 90		90 - 110		111 - 120		121 +			
	No.	%	No.	%	No.	%	No.	%	No.	%
1.	10	(12.3)	70	(28.9)	39	(52.7)	20	(58.8)	139	(32.2)
2.	30	(37.0)	61	(25.2)	14	(18.9)	6	(17.6)	111	(25.8)
3.	27	(33.3)	74	(30.6)	15	(20.3)	5	(14.7)	121	(28.1)
4.	14	(17.3)	37	(15.3)	6	(8.1)	3	(8.8)	60	(13.9)
<b>TOTAL</b>	<b>81</b>	<b>(99.9)</b>	<b>242</b>	<b>(100.0)</b>	<b>74</b>	<b>(100.0)</b>	<b>34</b>	<b>(99.9)</b>	<b>431</b>	<b>(100.0)</b>

$$D/F = 9, \quad \chi^2 = 42.58, \quad P < .001$$

TABLE 4B  
EDUCATIONAL ASPIRATION LEVEL RELATED TO I.Q. LEVEL  
FOR THE MEDIUM S.E.S. GROUP

Educational Aspiration Level	I.Q. Level								TOTAL	
	- 90		90 - 110		111 - 120		121 +			
	No.	%	No.	%	No.	%	No.	%	No.	%
1.	12	(16.2)	108	(38.7)	82	(58.2)	88	(80.0)	290	(48.0)
2.	21	(28.4)	64	(22.9)	22	(15.6)	8	(7.3)	115	(19.0)
3.	30	(40.5)	78	(28.0)	28	(19.8)	8	(7.3)	144	(23.8)
4.	11	(14.9)	29	(10.4)	9	(6.4)	6	(5.4)	55	(9.1)
<b>TOTAL</b>	<b>74</b>	<b>(100.0)</b>	<b>279</b>	<b>(100.0)</b>	<b>141</b>	<b>(100.0)</b>	<b>110</b>	<b>(100.0)</b>	<b>604</b>	<b>(99.9)</b>

$$D/F = 9, \quad \chi^2 = 91.77, \quad P < .001$$

**TABLE 4C**  
**EDUCATIONAL ASPIRATION LEVEL RELATED TO I.Q. LEVEL**  
**FOR THE HIGH S.E.S. GROUP**

<b>Educational Aspiration Level</b>	<b>I.Q. Level</b>						<b>TOTAL</b>
	<b>- 90</b>	<b>90 - 110</b>	<b>111 - 120</b>	<b>121 +</b>	<b>No.</b>	<b>%</b>	
1.	9 (31.0)	88 (52.4)	67 (66.3)	85 (82.5)	249	(62.1)	
2.	7 (24.1)	35 (20.8)	10 (9.9)	4 (3.9)	56	(14.0)	
3.	10 (34.5)	35 (20.8)	16 (15.8)	12 (11.7)	73	(18.2)	
4.	3 (10.3)	10 (6.0)	8 (7.9)	2 (1.9)	23	(5.7)	
<b>TOTAL</b>	<b>29 (99.9)</b>	<b>168 (100.0)</b>	<b>101 (99.9)</b>	<b>103 (100.0)</b>	<b>401</b>	<b>(100.0)</b>	

$$D/F = 9, \quad X^2 = 42.90, \quad P < .001$$

**TABLE 4D**  
**OCCUPATIONAL ASPIRATION LEVEL RELATED TO I.Q. LEVEL  
FOR THE MEDIUM S.E.S. GROUP**

Occupational Aspiration Score	I.Q. Level					TOTAL
	- 90	90 - 110	111 - 120	121 +	No. %	
56 - 72	- -	20 (7.2)	18 (12.9)	27 (24.5)	65 (10.9)	
46 - 55	12 (17.4)	98 (35.4)	51 (36.4)	47 (42.7)	208 (34.9)	
36 - 45	30 (43.5)	97 (35.0)	50 (35.7)	27 (24.5)	204 (34.2)	
0 - 35	27 (39.1)	62 (22.4)	21 (15.0)	9 (8.2)	119 (20.0)	
<b>TOTAL</b>	<b>69 (100.0)</b>	<b>277 (100.0)</b>	<b>140 (100.0)</b>	<b>110 (99.9)</b>	<b>596 (100.0)</b>	

$$D/F = 9, \quad X^2 = 66.09, \quad P < .001$$

**TABLE 4E**  
**OCCUPATIONAL ASPIRATION LEVEL RELATED TO I.Q. LEVEL  
FOR THE HIGH S.E.S. GROUP**

Occupational Aspiration Score	I.Q. Level					TOTAL
	- 90	90 - 110	111 - 120	121 +	No. %	
56 - 72	1 (3.4)	20 (12.1)	13 (12.7)	29 (27.6)	63 (15.7)	
46 - 55	12 (41.4)	61 (37.0)	43 (42.2)	40 (38.1)	156 (38.9)	
36 - 45	8 (27.6)	54 (32.7)	32 (31.4)	28 (26.7)	122 (30.4)	
0 - 35	8 (27.6)	30 (18.2)	14 (13.7)	8 (7.6)	60 (15.0)	
<b>TOTAL</b>	<b>29 (100.0)</b>	<b>165 (100.0)</b>	<b>102 (100.0)</b>	<b>105 (100.0)</b>	<b>401 (100.0)</b>	

$$D/F = 9, \quad X^2 = 25.64, \quad P < .01$$

TABLE 5A

**EDUCATIONAL ASPIRATION LEVEL RELATED TO GRADE NINE  
EXAMINATION MARKS FOR THE LOW S.E.S. GROUP**

Educational Aspiration Level	Grade Nine Marks					
	0 - 66		67 +		TOTAL	
	No.	%	No.	%	No.	%
1.	42	(19.6)	101	(45.9)	143	(32.9)
2.	57	(26.6)	54	(24.5)	111	(25.6)
3.	79	(36.9)	42	(19.1)	121	(27.9)
4.	36	(16.8)	23	(10.5)	59	(13.6)
<b>TOTAL</b>	<b>214</b>	<b>(99.9)</b>	<b>220</b>	<b>(100.0)</b>	<b>434</b>	<b>(100.0)</b>

$$D/F = 3, \chi^2 = 38.52, P < .001$$

TABLE 5B

**EDUCATIONAL ASPIRATION LEVEL RELATED TO GRADE NINE  
EXAMINATION MARKS FOR THE MEDIUM S.E.S. GROUP**

Educational Aspiration Level	Grade Nine Marks					
	0 - 66		67 +		TOTAL	
	No.	%	No.	%	No.	%
1.	72	(27.4)	218	(63.0)	290	(47.6)
2.	63	(24.0)	54	(15.6)	117	(19.2)
3.	92	(35.0)	54	(15.6)	146	(24.0)
4.	36	(13.7)	20	(5.8)	56	(9.2)
<b>TOTAL</b>	<b>263</b>	<b>(100.1)</b>	<b>346</b>	<b>(100.0)</b>	<b>609</b>	<b>(100.0)</b>

$$A/F = 3, \chi^2 = 78.80, P < .001$$

TABLE 5C

**EDUCATIONAL ASPIRATION LEVEL RELATED TO GRADE NINE  
EXAMINATION MARKS FOR THE HIGH S.E.S. GROUP**

Educational Aspiration Level	Grade Nine Marks					
	0 - 66		67 +		TOTAL	
	No.	%	No.	%	No.	%
1.	53	(35.3)	202	(78.6)	255	(62.7)
2.	32	(21.3)	24	(9.3)	56	(13.8)
3.	48	(32.0)	25	(9.7)	73	(17.9)
4.	17	(11.3)	6	(2.3)	23	(5.7)
<b>TOTAL</b>	<b>150</b>	<b>(99.9)</b>	<b>257</b>	<b>(99.9)</b>	<b>407</b>	<b>(100.1)</b>

$$D/F = 3, \chi^2 = 77.97, P < .001$$

**TABLE 5D**  
**OCCUPATIONAL ASPIRATION LEVEL RELATED TO GRADE NINE  
EXAMINATION MARKS FOR THE LOW S.E.S. GROUP**

<b>Occupational Aspiration Score</b>	<b>Grade Nine Marks</b>					
	<b>0 - 66</b>		<b>67 +</b>		<b>TOTAL</b>	
	No.	%	No.	%	No.	%
56 - 72	7	( 3.2)	24	( 10.7)	31	( 7.0)
46 - 55	50	(23.0)	79	( 35.3)	129	(29.3)
36 - 45	82	(37.8)	71	( 31.7)	153	(34.7)
0 - 35	78	(35.9)	50	(22.3)	128	(29.0)
<b>TOTAL</b>	<b>217</b>	<b>(99.9)</b>	<b>224</b>	<b>(100.0)</b>	<b>441</b>	<b>(100.0)</b>

$$D/F = 3, \quad X^2 = 22.65, \quad P < .001$$

**TABLE 5E**  
**OCCUPATIONAL ASPIRATION LEVEL RELATED TO GRADE NINE  
EXAMINATION MARKS FOR THE MEDIUM S.E.S. GROUP**

<b>Occupational Aspiration Score</b>	<b>Grade Nine Marks</b>					
	<b>0 - 66</b>		<b>67 +</b>		<b>TOTAL</b>	
	No.	%	No.	%	No.	%
56 - 72	10	( 3.9)	55	(16.0)	65	(10.8)
46 - 55	79	(30.7)	131	(38.1)	210	(34.9)
36 - 45	98	(38.1)	108	(31.4)	206	(34.3)
0 - 35	70	(27.2)	50	(14.5)	120	(20.0)
<b>TOTAL</b>	<b>257</b>	<b>(99.9)</b>	<b>344</b>	<b>(100.0)</b>	<b>601</b>	<b>(100.0)</b>

$$D/F = 3, \quad X^2 = 36.00, \quad P < .001$$

TABLE 5F

OCCUPATIONAL ASPIRATION LEVEL RELATED TO GRADE NINE  
EXAMINATION MARKS FOR THE HIGH S.E.S. GROUP

Occupational Aspiration Score	Grade Nine Marks				<b>TOTAL</b>	
	0 - 66		67 +			
	No.	%	No.	%	No.	%
56 - 72	7	(4.7)	57	(22.0)	64	(15.7)
46 - 55	45	(30.4)	113	(43.6)	158	(38.8)
36 - 45	57	(38.5)	67	(25.9)	124	(30.5)
0 - 35	39	(26.4)	22	(8.5)	61	(15.0)
<b>TOTAL</b>	<b>148</b>	<b>(100.0)</b>	<b>259</b>	<b>(100.0)</b>	<b>407</b>	<b>(100.0)</b>

D/F = 3,  $\chi^2 = 49.79$ , P < .001

TABLE 5G  
EDUCATIONAL ASPIRATION LEVEL RELATED TO GRADE TEN  
EXAMINATION MARKS FOR THE LOW S.E.S. GROUP

Educational Aspiration Level	Grade Ten Marks		TOTAL
	50 - 66	67 +	
1.	65 (24.2)	70 (60.9)	135 (35.2)
2.	85 (31.7)	20 (17.4)	105 (27.4)
3.	78 (29.1)	17 (14.8)	95 (24.8)
4.	40 (14.9)	8 ( 6.9)	48 (12.5)
TOTAL	268 (99.9)	115 (100.0)	383 (99.9)

$$D/F = 3, \chi^2 = 47.36, P < .001$$

TABLE 5H  
EDUCATIONAL ASPIRATION LEVEL RELATED TO GRADE TEN  
EXAMINATION MARKS FOR THE MEDIUM S.E.S. GROUP

Educational Aspiration Level	Grade Ten Marks		TOTAL	
	No.	%		
1.	130 (39.4)		127 (70.9)	257 (50.5)
2.	82 (24.8)		24 (13.4)	106 (20.8)
3.	89 (27.0)		15 ( 8.4)	104 (20.4)
4.	29 ( 8.8)		13 ( 7.3)	42 ( 8.3)
TOTAL	330 (100.0)		179 (100.0)	509 (100.0)

$$D/F = 3, \chi^2 = 50.13, P < .001$$

TABLE 51  
EDUCATIONAL ASPIRATION LEVEL RELATED TO GRADE TEN  
EXAMINATION MARKS FOR THE HIGH S.E.S. GROUP

Educational Aspiration Level	Grade Ten Marks					
	50 - 66		67 +		TOTAL	
	No.	%	No.	%	No.	%
1.	104	(51.2)	125	(85.6)	229	(65.6)
2.	30	(14.8)	15	(10.3)	45	(12.9)
3.	52	(25.6)	5	( 3.4)	57	(16.3)
4.	17	( 8.4)	1	( 0.7)	18	( 5.2)
TOTAL	203	(100.0)	146	(100.0)	349	(100.0)

D/F = 3,  $\chi^2 = 51.97$ , P < .001

TABLE 5J

**OCCUPATIONAL ASPIRATION LEVEL RELATED TO GRADE TEN  
EXAMINATION MARKS FOR THE LOW S.E.S. GROUP**

<b>Occupational Aspiration Score</b>	<b>Grade Ten Marks</b>					
	<b>0 - 66</b>		<b>67 +</b>		<b>TOTAL</b>	
	<b>No.</b>	<b>%</b>	<b>No.</b>	<b>%</b>	<b>No.</b>	<b>%</b>
56 - 72	14	( 5.1)	17	(14.8)	31	( 7.9)
46 - 55	76	(27.6)	44	(38.3)	120	(30.8)
36 - 45	94	(34.2)	40	(34.8)	134	(34.4)
0 - 35	91	(33.1)	14	(12.2)	105	(26.9)
<b>TOTAL</b>	<b>275</b>	<b>(100.0)</b>	<b>115</b>	<b>(100.1)</b>	<b>390</b>	<b>(100.0)</b>

$$D/F = 3, \quad X^2 = 25.74, \quad P < .001$$

TABLE 5K

**OCCUPATIONAL ASPIRATION LEVEL RELATED TO GRADE TEN  
EXAMINATION MARKS FOR THE MEDIUM S.E.S. GROUP**

<b>Occupational Aspiration Score</b>	<b>Grade Ten Marks</b>					
	<b>0 - 66</b>		<b>67 +</b>		<b>TOTAL</b>	
	<b>No.</b>	<b>%</b>	<b>No.</b>	<b>%</b>	<b>No.</b>	<b>%</b>
56 - 72	21	( 6.3)	37	(20.6)	58	(11.3)
46 - 55	111	(33.5)	75	(41.7)	186	(36.4)
36 - 45	126	(38.1)	47	(26.1)	173	(33.9)
0 - 35	73	(22.1)	21	(11.7)	94	(18.4)
<b>TOTAL</b>	<b>331</b>	<b>(100.0)</b>	<b>180</b>	<b>(100.1)</b>	<b>511</b>	<b>(100.0)</b>

$$D/F = 3, \quad X^2 = 34.62, \quad P < .001$$

TABLE 5L

**OCCUPATIONAL ASPIRATION LEVEL RELATED TO GRADE TEN  
EXAMINATION MARKS FOR THE HIGH S.E.S. GROUP**

Occupational Aspiration Score	Grade Ten Marks				<b>TOTAL</b>	
	0 - 66		67 +			
	No.	%	No.	%	No.	%
56 - 72	15	(7.3)	44	(29.7)	59	(16.7)
46 - 55	71	(34.5)	71	(48.0)	142	(40.1)
36 - 45	74	(35.9)	29	(19.6)	103	(29.1)
0 - 35	46	(22.3)	4	(2.7)	50	(14.1)
<b>TOTAL</b>	<b>206</b>	<b>(100.0)</b>	<b>148</b>	<b>(100.0)</b>	<b>354</b>	<b>(100.0)</b>

D/F = 3,  $\chi^2 = 65.41$ , P < .001

TABLE 5M

**EDUCATIONAL ASPIRATION LEVEL RELATED TO GRADE ELEVEN  
EXAMINATION MARKS FOR THE LOW S.E.S. GROUP**

Educational Aspiration Level	Grade Eleven Marks		<b>TOTAL</b>
	0 - 66	67 +	
1.	No. 48 (%) 31.6	No. 20 (%) 69.0	No. 68 (%) 37.6
2.	43 (28.3)	4 (13.8)	47 (26.0)
3.	46 (30.3)	4 (13.8)	50 (27.6)
4.	15 (9.9)	1 (3.4)	16 (8.8)
<b>TOTAL</b>	<b>152 (100.0)</b>	<b>29 (100.0)</b>	<b>181 (100.0)</b>

$$D/F = 3, \quad X^2 = 14.55, \quad P < .01$$

TABLE 5N

**EDUCATIONAL ASPIRATION LEVEL RELATED TO GRADE ELEVEN  
EXAMINATION MARKS FOR THE MEDIUM S.E.S. GROUP**

Educational Aspiration Level	Grade Eleven Marks		<b>TOTAL</b>
	0 - 66	67 +	
1.	No. 79 (%) 47.3	No. 45 (%) 71.4	No. 124 (%) 53.9
2.	40 (23.9)	7 (11.1)	47 (20.4)
3.	35 (21.0)	6 (9.5)	41 (17.8)
4.	13 (7.8)	5 (7.9)	18 (7.8)
<b>TOTAL</b>	<b>167 (100.0)</b>	<b>63 (99.9)</b>	<b>230 (99.9)</b>

$$D/F = 3, \quad X^2 = 11.98, \quad P < .01$$

**TABLE 5 O**  
**EDUCATIONAL ASPIRATION LEVEL RELATED TO GRADE ELEVEN  
 EXAMINATION MARKS FOR THE HIGH S.E.S. GROUP**

<b>Educational Aspiration Level</b>	<b>Grade Eleven Marks</b>					
	<b>0 - 66</b>		<b>67 +</b>		<b>TOTAL</b>	
	<b>No.</b>	<b>%</b>	<b>No.</b>	<b>%</b>	<b>No.</b>	<b>%</b>
1.	51	(54.8)	42	(93.3)	93	(67.4)
2.	17	(18.3)	2	( 4.4)	19	(13.8)
3.	19	(20.4)	1	( 2.2)	20	(14.5)
4.	6	( 6.5)	-	-	6	( 4.3)
<b>TOTAL</b>	<b>93</b>	<b>(100.0)</b>	<b>45</b>	<b>(99.9)</b>	<b>138</b>	<b>(100.0)</b>

D/F = 3,  $\chi^2 = 20.72$ , P < .001

**TABLE 5P**  
**OCCUPATIONAL ASPIRATION LEVEL RELATED TO GRADE ELEVEN  
 EXAMINATION MARKS FOR THE MEDIUM S.E.S. GROUP**

Occupational Aspiration Score	Grade Eleven Marks					
	0 - 66		67 +		TOTAL	
	No.	%	No.	%	No.	%
56 - 72	13	(7.6)	11	(17.5)	24	(10.3)
46 - 55	60	(35.3)	33	(52.4)	93	(39.9)
36 - 45	64	(37.6)	14	(22.2)	78	(33.5)
0 - 35	33	(19.4)	5	(7.9)	38	(16.3)
<b>TOTAL</b>	<b>170</b>	<b>(99.9)</b>	<b>63</b>	<b>(100.0)</b>	<b>233</b>	<b>(100.0)</b>

$$D/F = 3, \chi^2 = 14.63, P < .01$$

**TABLE 5Q**  
**OCCUPATIONAL ASPIRATION LEVEL RELATED TO GRADE ELEVEN  
 EXAMINATION MARKS FOR THE HIGH S.E.S. GROUP**

Occupational Aspiration Score	Grade Eleven Marks					
	0 - 66		67 +		TOTAL	
	No.	%	No.	%	No.	%
56 - 72	14	(14.7)	12	(26.7)	26	(18.6)
46 - 55	31	(32.6)	25	(55.6)	56	(40.0)
36 - 45	32	(33.7)	6	(13.3)	38	(27.1)
0 - 35	18	(18.9)	2	(4.4)	20	(14.3)
<b>TOTAL</b>	<b>95</b>	<b>(99.9)</b>	<b>45</b>	<b>(100.0)</b>	<b>140</b>	<b>(100.0)</b>

$$D/F = 3, \chi^2 = 17.69, P < .01$$

TABLE 6A

**EDUCATIONAL ASPIRATION LEVEL RELATED TO TEACHERS'  
ENCOURAGEMENT FOR THE LOW S.E.S. GROUP**

Educational Aspiration Level	Teachers' Encouragement						TOTAL	
	Strong		Some		Little or None			
	No.	%	No.	%	No.	%	No.	%
1.	72	(41.4)	65	(36.7)	41	(24.3)	178	(34.2)
2.	42	(24.1)	47	(26.6)	44	(26.0)	133	(25.6)
3.	40	(23.0)	42	(23.7)	61	(36.1)	143	(27.5)
4.	20	(11.5)	23	(13.0)	23	(13.6)	66	(12.7)
<b>TOTAL</b>	<b>174</b>	<b>(100.0)</b>	<b>177</b>	<b>(100.0)</b>	<b>169</b>	<b>(100.0)</b>	<b>520</b>	<b>(100.0)</b>

$$D/F = 6, \chi^2 = 15.11, P < .02$$

TABLE 6B

**EDUCATIONAL ASPIRATION LEVEL RELATED TO TEACHERS'  
ENCOURAGEMENT FOR THE MEDIUM S.E.S. GROUP**

Educational Aspiration Level	Teachers' Encouragement						TOTAL	
	Strong		Some		Little or None			
	No.	%	No.	%	No.	%	No.	%
1.	138	(58.0)	101	(45.3)	117	(42.5)	356	(48.4)
2.	45	(18.9)	43	(19.3)	50	(18.2)	138	(18.8)
3.	39	(16.4)	65	(29.1)	69	(25.1)	173	(23.5)
4.	16	( 6.7)	14	( 6.3)	39	(14.2)	69	( 9.4)
<b>TOTAL</b>	<b>238</b>	<b>(100.0)</b>	<b>223</b>	<b>(100.0)</b>	<b>275</b>	<b>(100.0)</b>	<b>736</b>	<b>(100.1)</b>

$$D/F = 6, \chi^2 = 26.28, P < .001$$

TABLE 6C  
OCCUPATIONAL ASPIRATION LEVEL RELATED TO TEACHERS'  
ENCOURAGEMENT FOR THE LOW S.E.S. GROUP

Occupational Aspiration Score	Strong		Teachers' Encouragement		TOTAL	
	No.	%	No.	%	No.	%
56 - 72	21	(11.9)	17	(4.8)	38	(7.2)
46 - 55	58	(33.0)	95	(27.1)	153	(29.0)
36 - 45	51	(29.0)	132	(37.6)	183	(34.7)
0 - 35	46	(26.1)	107	(30.5)	153	(29.0)
<b>TOTAL</b>	<b>176</b>	<b>(100.0)</b>	<b>351</b>	<b>(100.0)</b>	<b>527</b>	<b>(99.9)</b>

D/F = 3,  $\chi^2 = 12.84$ , P < .01

#### LEVEL 6D

OCCUPATIONAL ASPIRATION LEVEL RELATED TO TEACHERS'  
ENCOURAGEMENT FOR THE MEDIUM S.E.S. GROUP

Occupational Aspiration Score	Strong		Teachers' Encouragement		TOTAL	
	No.	%	No.	%	No.	%
56 - 72	47	(19.6)	44	(8.9)	91	(12.4)
46 - 55	92	(38.3)	157	(31.8)	249	(33.9)
36 - 45	68	(28.3)	177	(35.8)	245	(33.4)
0 - 35	33	(13.7)	116	(23.5)	149	(20.3)
<b>TOTAL</b>	<b>240</b>	<b>(99.9)</b>	<b>494</b>	<b>(100.0)</b>	<b>734</b>	<b>(100.0)</b>

D/F = 3,  $\chi^2 = 27.15$ , P < .001

TABLE 7A

EDUCATIONAL ASPIRATION LEVEL RELATED TO SELF-RATED  
LEADERSHIP ABILITY FOR THE LOW S.E.S. GROUP

Educational Aspiration Level	Leadership Ability						TOTAL	
	+ Average		Average		- Average			
	No.	%	No.	%	No.	%	No.	%
1.	21	(70.0)	137	(33.0)	18	(26.1)	176	(34.2)
2.	5	(16.6)	110	(26.5)	16	(23.2)	131	(25.5)
3.	3	(10.0)	117	(28.2)	22	(31.9)	142	(27.6)
4.	1	(3.3)	51	(12.3)	13	(18.8)	65	(12.6)
TOTAL	30	(99.9)	415	(100.0)	69	(100.0)	514	(99.9)

$$D/F = 6, \chi^2 = 22.02, P < .01$$

TABLE 7B

EDUCATIONAL ASPIRATION LEVEL RELATED TO SELF-RATED  
LEADERSHIP ABILITY FOR THE MEDIUM S.E.S. GROUP

Educational Aspiration Level	Leadership Ability						TOTAL	
	+ Average		Average		- Average			
	No.	%	No.	%	No.	%	No.	%
1.	54	(71.0)	275	(47.6)	28	(36.8)	357	(48.9)
2.	4	(5.3)	115	(19.9)	17	(22.4)	136	(18.6)
3.	13	(17.1)	131	(22.7)	25	(32.9)	169	(23.2)
4.	5	(6.6)	57	(9.9)	6	(7.9)	68	(9.3)
TOTAL	76	(100.0)	578	(100.1)	76	(100.0)	730	(100.0)

$$D/F = 6, \chi^2 = 23.78, P < .001$$

TABLE 7C

**EDUCATIONAL ASPIRATION LEVEL RELATED TO SELF-RATED  
LEADERSHIP ABILITY FOR THE HIGH S.E.S. GROUP**

Educational Aspiration Level	Leadership Ability						<b>TOTAL</b>	
	+ Average		Average		- Average			
	No.	%	No.	%	No.	%	No.	%
1.	72	(84.7)	225	(59.4)	20	(48.8)	317	(62.8)
2.	5	( 5.9)	62	(16.4)	10	(24.4)	77	(15.2)
3.	7	( 8.2)	67	(17.7)	6	(14.6)	80	(15.8)
4.	1	( 1.2)	25	( 6.6)	5	(12.2)	31	( 6.1)
<b>TOTAL</b>	<b>85</b>	<b>(100.0)</b>	<b>379</b>	<b>(100.1)</b>	<b>41</b>	<b>(100.0)</b>	<b>505</b>	<b>(99.9)</b>

$$D/F = 6, \chi^2 = 25.87, P < .001$$

TABLE 7D

**OCCUPATIONAL ASPIRATION LEVEL RELATED TO SELF-RATED  
LEADERSHIP ABILITY FOR THE LOW S.E.S. GROUP**

Occupational Aspiration Score	Leadership Ability						TOTAL	
	+ Average		Average		- Average			
	No.	%	No.	%	No.	%	No.	%
56 - 72	6	(20.0)	29	(6.9)	2	(2.8)	37	(7.1)
46 - 55	14	(46.7)	124	(29.4)	16	(22.9)	154	(29.5)
36 - 45	8	(26.7)	147	(34.8)	26	(37.1)	181	(34.7)
0 - 35	2	(6.7)	122	(28.9)	26	(37.1)	150	(28.7)
<b>TOTAL</b>	<b>30</b>	<b>(100.1)</b>	<b>422</b>	<b>(100.0)</b>	<b>70</b>	<b>(99.9)</b>	<b>522</b>	<b>(100.0)</b>

$$D/F = 6, \quad X^2 = 20.38, \quad P < .01$$

TABLE 7E

**OCCUPATIONAL ASPIRATION LEVEL RELATED TO SELF-RATED  
LEADERSHIP ABILITY FOR THE MEDIUM S.E.S. GROUP**

Occupational Aspiration Score	Leadership Ability						TOTAL	
	+ Average		Average		- Average			
	No.	%	No.	%	No.	%	No.	%
56 - 72	21	(27.3)	67	(11.6)	3	(3.9)	91	(12.5)
46 - 55	35	(45.5)	194	(33.7)	20	(26.0)	249	(34.1)
36 - 45	10	(13.0)	203	(35.2)	30	(39.0)	243	(33.3)
0 - 35	11	(14.3)	112	(19.4)	24	(31.2)	147	(20.1)
<b>TOTAL</b>	<b>77</b>	<b>(100.1)</b>	<b>576</b>	<b>(100.0)</b>	<b>77</b>	<b>(100.1)</b>	<b>730</b>	<b>(100.0)</b>

$$D/F = 6, \quad X^2 = 39.87, \quad P < .001$$

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TABLE 7F

**OCCUPATIONAL ASPIRATION LEVEL RELATED TO SELF-RATED  
LEADERSHIP ABILITY FOR THE HIGH S.E.S. GROUP**

<b>Occupational Aspiration Score</b>	<b>Leadership Ability</b>			<b>TOTAL</b>
	<b>+ Average</b>	<b>Average</b>	<b>- Average</b>	
56 - 72	29 (34.1)	47 (12.5)	4 ( 9.8)	80 (15.9)
46 - 55	35 (41.2)	148 (39.3)	13 (31.7)	196 (39.0)
36 - 45	18 (21.2)	127 (33.7)	13 (31.7)	158 (31.4)
0 - 35	3 ( 3.5)	55 (14.6)	11 (26.8)	69 (13.7)
<b>TOTAL</b>	<b>85 (100.0)</b>	<b>377 (100.1)</b>	<b>41 (100.0)</b>	<b>503 (100.0)</b>

$D/F = 6, X^2 = 37.40, P < .001$

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TABLE 8A

**EDUCATIONAL ASPIRATION LEVEL RELATED TO EXTRA-CURRICULAR ACTIVITY FOR THE MEDIUM S.E.S. GROUP**

Educational Aspiration Level	Extra-Curricular Activity					TOTAL		
	0	1	2	3 +				
	No.	%	No.	%	No.	%	No.	%
1.	83	(41.1)	155	(47.8)	71	(53.4)	47	(60.2)
2.	39	(19.3)	57	(17.6)	27	(20.3)	16	(20.5)
3.	63	(31.2)	74	(22.8)	24	(18.0)	13	(16.7)
4.	17	(8.4)	38	(11.7)	11	(8.3)	2	(2.6)
TOTAL	202	(100.0)	324	(99.9)	133	(100.0)	78	(100.0)
							737	(100.0)

$$D/F = 9, \chi^2 = 20.32, P < .02$$

TABLE 8B

**EDUCATIONAL ASPIRATION LEVEL RELATED TO EXTRA-CURRICULAR ACTIVITY FOR THE HIGH S.E.S. GROUP**

Educational Aspiration Level	Extra-Curricular Activity					TOTAL		
	0	1	2	3 +				
	No.	%	No.	%	No.	%	No.	%
1.	58	(50.9)	146	(64.3)	63	(67.7)	51	(68.9)
2.	15	(13.1)	30	(13.2)	16	(17.2)	16	(21.6)
3.	26	(22.9)	39	(17.2)	12	(12.9)	5	(6.8)
4.	15	(13.2)	12	(5.3)	2	(2.2)	2	(2.7)
TOTAL	114	(100.0)	227	(100.0)	93	(100.0)	74	(100.0)
							508	(100.0)

$$D/F = 9, \chi^2 = 27.89, P < .001$$

TABLE 8C  
OCCUPATIONAL ASPIRATION LEVEL RELATED TO EXTRA-CURRICULAR ACTIVITY FOR THE MEDIUM S.E.S. GROUP

Occupational Aspiration Score	Extra-Curricular Activity								TOTAL
	0	1	2	3 +	No.	%	No.	%	
56 - 72	19 (9.5)	31 (9.6)	24 (17.6)	17 (21.8)	91	(12.3)			
46 - 55	54 (27.0)	18 (36.4)	50 (36.8)	28 (35.9)	250	(33.2)			
36 - 45	71 (35.5)	111 (34.3)	41 (30.1)	24 (30.8)	247	(33.5)			
0 - 35	56 (28.0)	64 (19.7)	21 (15.4)	9 (11.5)	150	(20.3)			
<b>TOTAL</b>	<b>200 (100.0)</b>	<b>324 (100.0)</b>	<b>136 (99.9)</b>	<b>78 (100.0)</b>	<b>738 (100.0)</b>				

$$D/F = 9, \chi^2 = 27.26, P < .01$$

TABLE 8D  
OCCUPATIONAL ASPIRATION LEVEL RELATED TO EXTRA-CURRICULAR ACTIVITY FOR THE HIGH S.E.S. GROUP

Occupational Aspiration Score	Extra-Curricular Activity								TOTAL
	0	1	2	3 +	No.	%	No.	%	
56 - 72	10 (8.8)	34 (15.0)	22 (23.6)	14 (18.4)	80	(15.7)			
46 - 55	43 (38.1)	84 (37.0)	30 (32.3)	40 (52.6)	197	(38.7)			
36 - 45	32 (28.3)	77 (33.9)	32 (34.4)	19 (25.0)	160	(31.4)			
0 - 35	28 (24.8)	32 (14.1)	9 (9.7)	3 (3.9)	72	(14.1)			
<b>TOTAL</b>	<b>113 (100.0)</b>	<b>227 (100.0)</b>	<b>93 (100.0)</b>	<b>76 (99.9)</b>	<b>509 (99.9)</b>				

$$D/F = 9, \chi^2 = 30.53, P < .001$$